Rational and Intuitive Decision Making Style

Olga Pilipczuk

University of Szczecin, Poland

INTRODUCTION

Many years ago, researchers emphasized the advantage of rational decision-making over intuitive decision-making. The main reason for this was that many scientists thought that intuitive ways of solving problems belonged to the realm of the irrational or even paranormal. Scientists believed that intuitive processes are beyond the scope of research. However, research on cognitive science and artificial intelligence proved that there is nothing mystical about the intuition in decision-making process. An important factor influencing behavioral decisions that go beyond logic and rationality is intuition (Griffin, 1996).

Intuition is used:

- when there is ambiguity and lack of clarity of data,
- when there is no precedent information,
- in the case of the nonprogrammable nature of alternative,
- in nonroutine situations that require a specific approach,
- in the case of high importance of the decision and its results,
- under time pressure,
- etc.

However, with the increase in uncertainty and the number of independent variables, decisions become more complex and intuitive judgments less reliable. Analytics needs reliable methods and tools that will help make better choices between alternatives – the rational decision-making style, which is the logical and structured approach to find the information, assessment of information,

DOI: 10.4018/978-1-4666-5202-6.ch179

and evaluation of information during the decision-making process.

Today very few managers make decisions only on the basis of well-deliberated calculations. They often neglect the normative rules when making decisions under crisis conditions. Instead, they take advantage of intuition or "a hunch." However, many managers, if there is a possibility, try to combine the rational and intuitive approach. Researchers have emphasized the desirability of the use of methods which combine these two management styles.

BACKGROUND

Although, the subject of intuition is very popular today, there has been little in-depth scientific work carried out in this area. Most of the research done has been theoretical in nature.

Intuition is one of the most imprecise concepts related to the process of decision making. In the literature, the term intuition has many interpretations: judgment, insight or gut feeling (Dean, Mihalasky, Ostrander, & Schroeder, 1974), extrasensory perception (Leavitt, 1975b), irrationality (Cohen & March, 1974), recognition (Goldberg, 1983), the edge (Tichy, 1997) etc. These, sometimes unusual definitions indicate the diverse nature of intuition.

Selye defined intuition as an unconscious intelligence observed without reasoning or inference; "it is an immediate understanding or knowledge without rational thinking" (Dobrołowicz, 1995).

An interesting definition of intuition was given by Vaughan. He treated intuition as a synthetic psychological function, which allows recognizing the situation as a whole. Intuition also allows us to synthesize data and experience to one integrated image. It is a holistic perception of reality that goes beyond the rational ways of knowing (Vaughan, 1990).

Intuition could also be defined as "instinctively know something, the state of being conscious of something or know something without a subject or explore the perception of something" (Encarta, 1999). Klein's (Klein, 2003) understanding of intuition is relatively more specific, and he indicated its relationship to decision-making. According to his theory, experts assess the situation on the basis of a comparison with similar situations already experienced.

Many successful entrepreneurs owe their success to intuition. Bill Gates believes that one cannot ignore their intuition (Weinstein, 2010). Entrepreneur T. Chappell indicates that he created his company, based on his own intuition, against the advice of specialists in marketing and advertising. Famous financier G. Soros appreciates the unconscious calculation (Soros, 1995). D. Trump admits that he has created his trillion-dollar empire through his intuition. Apparently, General Motors Vice President, Robert Lutz, narrated that he intuitively decided to invest \$80 million in a sports car with exceptionally high performance, priced at \$50,000 (Hayashi, 2001). Most entrepreneurs are guided by intuition when introducing a new product or service, as well as when making decisions on mergers, acquisitions, exemptions, and investment decisions.

Psychological tests carried out on a group of American managers have also shown that people with highly developed intuition have a proven greater financial success than those using only logic (Anderson, 1990; Davis & Davis, 2003; Isenberg, 2001; Hitt, Black, & Porter, 2005; Khatri & Ng, 2000; Westcott, 1968; Sadler-Smith, 2004; Frantz, 2005; Sadler-Smith & Shefy, 2004; Weick & Sutcliffe, 2001). Researchers increasingly give evidence that depending on the complexity of the problem, in general, intuitive thinking can be as powerful and accurate a tool as rational analysis

(Dijksterhuis, 2004; Witteman & Van den Bercken, 2007; Plessner & Czenna, 2008). The superiority of intuition over rational thinking, especially in complex decision-making situations, was confirmed by Kahneman (Kahneman, 2003).

Michel Pratt said: "It turns out intuition isn't always bad and there are conditions where it is a good way to make the right decision. Intuition may be as effective in decision-making as an analytical approach — and sometimes more efficient and effective, depending on the decision-maker's level of expertise on the subject at hand" (Dane, Rockman, & Pratt, 2012). Dane, Rockman and Pratt found that "the effectiveness of intuition relative to analysis is amplified at a high level of domain expertise."

However, managers are reluctant to admit to the use of intuition owing to the fear of negative comments from colleagues. Many researchers already in 60.h confirmed this fact (Agor, 1986a; Agor, 1986b; Agor, 1986c; Agor, 1986d; Vaughan, 1979; Hermann, 1981; Isenberg, 1984; Simon, 1987; Parikh, 1994 and many others).

Recently many people believe that intuition is to apply the principle of limited trust. Without any logical analysis and verification, it may manifest itself in prejudices, stereotypes, and fears and have serious consequences. The rational decision making style is still popular among managers, especially in operative decision making. A lot of rational methods applications have been done in recent years. (González, Payán, & Santos 2013; Salem, Miller, Deshpande, & Arurkar, 2013; Gu, Bohns, & Leonardelli, 2013; Chai, Liu, & Ngai, 2013; Badri, Rad, Kareshki, Abdolhamidzadeh, Parvizsedghy, & Rashtchian, 2013 and many others).

With the spread of the concept of bounded rationality (Jiang, Jiang, Xie, Wang, & Li, 2013; Lee, 2013; Yao, & Li, 2013; Gama, 2013; Jin, Jin, & Tan, 2013, Hembacher & Ghetti, 2013), a tendency to combine styles and methods of decision-making has emerged. Isenberg, in 1984, examined the behavior of executives from a hundred different organizations and proved that there was a trend to

10 more pages are available in the full version of this document, which may be purchased using the "Add to Cart" button on the publisher's webpage:

www.igi-global.com/chapter/rational-and-intuitive-decision-makingstyle/107387

Related Content

Optimizing the Accuracy of Entity-Based Data Integration of Multiple Data Sources Using Genetic Programming Methods

Yinle Zhou, Ali Koosheshand John Talburt (2012). *International Journal of Business Intelligence Research* (pp. 72-82).

www.irma-international.org/article/optimizing-accuracy-entity-based-data/62023

Emergence of NoSQL Platforms for Big Data Needs

Jyotsna Talreja Wassan (2014). *Encyclopedia of Business Analytics and Optimization (pp. 787-798).* www.irma-international.org/chapter/emergence-of-nosql-platforms-for-big-data-needs/107282

Predictive Analytics and Data Mining: A Framework for Optimizing Decisions with R Tool

Ritu Chauhanand Harleen Kaur (2016). *Business Intelligence: Concepts, Methodologies, Tools, and Applications (pp. 359-374).*

www.irma-international.org/chapter/predictive-analytics-and-data-mining/142628

The Making of a Successful Analytics Master Degree Program: Experiences and Lessons From an Asian University

Michelle LF Cheong (2017). *International Journal of Business Intelligence Research (pp. 1-16)*. www.irma-international.org/article/the-making-of-a-successful-analytics-master-degree-program/197401

Linear Programming

Xiaofeng Zhao (2014). Encyclopedia of Business Analytics and Optimization (pp. 1402-1410). www.irma-international.org/chapter/linear-programming/107335